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EXAMINER

BHATIA, AJAY M

ART UNIT PAPER NUMBER

2145

DATE MAILED: 09/08/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/065,623

Applicant(s)

ASCOLI ET AL.

Examiner

Ajay M. Bhatia

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 04 November 2002.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☒ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

***Oath/Declaration***

The oath or declaration is defective. A new oath or declaration in compliance with 37 CFR 1.67(a) identifying this application by application number and filing date is required. See MPEP §§ 602.01 and 602.02.

The oath or declaration is defective because: It is missing.

***Specification***

The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

The following title is suggested: METHOD FOR CONFIGURING A PROGRAMMABLE LOGIC CONTROLLER USING A XML SCHEMA.

***Claim Rejections - 35 USC § 112***

The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 1-20 rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. The specification fails to disclose how a schema

of XML can be use to create a schema for a protocol, it fails to provided enough information to reasonably convey to one of ordinary skill in the art. From the information provided one is not able to reproduced the claimed invention. Additionally applicant discusses validation of a XML but does not provided how it occurs within the specification or how the conversion occurs.

### ***Claim Rejections - 35 USC § 101***

35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

Claims 15-18 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter. Claims discusses names for different types of information, information or data is not patentable.

### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an

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international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1, 2, and 6 are rejected under 35 U.S.C. 102(e) as being anticipated by Helms (Patent Publication 2002/0078200).

For claim 1, Helms teaches, a method for configuring a programmable logic controller (PLC) having a protocol, said method comprising the step of providing an extensible markup language (XML) schema for the protocol of the PLC. (see Helms, paragraphs 18, 20, a processor is a PLC)

For claim 2, Helms teaches, a method according to claim 1 further comprising the step of configuring the PLC utilizing an XML file with grammar at least partially according to the schema. (see Helms, paragraphs 18-22, grammar is an inherent feature of XML)

For claim 6, Helms teaches, a method according to claim 1 wherein said step of providing an extensible markup language schema further comprises the step of providing an extensible markup language schema including definitions for the protocol of the PLC. (see Helms, paragraphs 18-22)

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 3-5 and 7-20 are rejected under 35 U.S.C. 103(a) as being obvious over Helms (Patent Publication 2002/0078200).

For claim 3, Helms teaches, a method according to claim 1 further comprising the step of utilizing the schema

Helms fail to clearly disclose, to validate at least one XML file.

It would be obvious, to validate at least one XML file. (see Helms, paragraphs 18-22, DTD are a obvious feature of the XML which are used to validate the schema use in a XML file)

It would have been obvious to one of ordinary skill in the art at the time of the invention was made to make use of a DTD (Document Type Definition) with Helms method of using a XML webpage to configure a processor device, since it is well known in the art to make use of DTD with XML files. (see XML files Introduction to DTD for an example of how a DTD works)

For claim 4, Helms teaches, a method according to claim 3 wherein said step of utilizing the schema

further comprises the step of utilizing the schema to validate at least one XML file created by a configuration tool. (see Helms, 18-22, DTD are obvious use to validate an XML file, the website is the configuration tool)

For claim 5, Helms teaches, a method according to claim 1 wherein said step of providing an extensible

markup language schema further comprises the step of providing an extensible markup language schema for a propriety protocol of the PLC. (see Helms, 18, 20, its obvious to convert a CSV file to a XML DTD, visual basic programming language means to accomplish this see SQL Server DTS for an example the propriety protocol is obvious in light of applicants own admitted prior art paragraph 2,3 of the background provides the EGD in a CSV format)

It would have been obvious to one of ordinary skill in the art at the time of the invention was made to define the schema used in CSV for a XML DTD since visual basic, a common programming language provided simple implementation to do in combination with Helms, since these are tools available to one of ordinary skill in the art.

For claim 7, Helms teaches, a method according to claim 4 wherein said step of utilizing the schema

further comprises the step of utilizing the schema to validate at least one XML file created by a configuration tool for a protocol different than the protocol of the PLC. (see Helms, paragraphs 18-22, a website is a configuration tool)

For claim 8, Helms teaches, a method according to claim 3 wherein said step of utilizing the schema

further comprises the step of utilizing the schema to validate at least one XML file parsed from a comma separated variable (CSV) file. (see Helms, paragraphs 18-22, its obvious to convert a CSV file to a XML DTD, java language means to accomplish this see CSV to XML and XML to CSV, other cited in the 892 for an examples)

For claim 9, Helms teaches, a method according to claim 8 wherein said step of utilizing the schema

further comprises the step of utilizing the schema to validate at least one XML file parsed from a comma separated variable (CSV) file created by a configuration tool. (see Helms, paragraphs 18-22, it is obvious to implement parsing of a CSV to XML using java language means to accomplish this see CSV to XML and XML to CSV, other cited in the 892 for an examples)

For claim 10, Helms teaches, a method according to claim 8 wherein said step of utilizing the schema



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further comprises the step of utilizing the schema to validate at least one XML file parsed from a comma separated variable (CSV) file created by a configuration tool for a protocol different than the protocol of the PLC. (see Helms, paragraphs 18-22, e-mails (SNMP) is a protocol different than the protocol of the PLC)

For claim 11, Helms teaches, a method according to claim 1 wherein said step of providing an extensible

markup language schema further comprises the step of providing an extensible markup language schema for an Ethernet Global Data protocol of the PLC. (see Helms, paragraphs 18-22) and (APA, paragraph 2,3)

For claim 12, Helms teaches, a method according to claim 11 further comprising the step of utilizing

the schema to validate at least one XML file. (see Helms, paragraphs 18-22, validation is obvious with the use of DTD and XML)

For claim 13, Helms teaches, a method according to claim 12 wherein said step of utilizing the schema

further comprises the step of utilizing the schema to validate at least one XML file created by an Ethernet Global Data configuration tool. (see Helms, paragraphs 18-22, validation is obvious with the use of a DTD and XML) and (APA,

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paragraph 2,3, since Ethernet Global Data, is configurable via the means of the website which defines the site as XML)

For claim 14, Helms teaches, a method according to claim 1 wherein said step of providing an XML schema

further comprises the step of providing an XML schema for the protocol of the PLC, the schema including at least one of an Build Information element, a Device element, and an Exchange element. (see Helms, paragraphs 18-22, all elements are obvious because they are definable by the user and are just data and are just labels given to data)

For claim 15, Helms teaches, a method according to claim 1 wherein said step of providing an XML schema

further comprises the step of providing an XML schema for the protocol of the PLC, the schema including at least one of an Build Information element, a Device element, and an Exchange element, the Build Information element including at least one of a Name element, a Description element, a Tool element, a Validation Code element, a Last Build Date element, and a Last Build Time element. (see Helms, paragraphs 18-22, all elements are obvious because they are definable by the user and are just data and are just labels given to data)

For claim 16, Helms teaches, a method according to claim 1 wherein said step of providing an XML schema

further comprises the step of providing an XML schema for the protocol of the PLC, the schema including at least one of an Build Information element, a Device element, and an Exchange element, the Device element including at least one of a Build Information element, a Device Configuration element, and a Device Validation element. (see Helms, paragraphs 18-22, all elements are obvious because they are definable by the user and are just data and are just labels given to data)

For claim 17, Helms teaches, a method according to claim 1 wherein said step of providing an XML schema

further comprises the step of providing an XML schema for the protocol of the PLC, the schema including at least one of an Build Information element, a Device element, and an Exchange element, the Exchange element including at least one of a Build Information element, a Name element, a Description element, a Producer Identifier (ID) element, a Exchange ID element, a Signature element, a Source element, a Destination element, a Period element, and a Timeout element. (see Helms, paragraphs 18-22, all elements are obvious because they are definable by the user and are just data and are just labels given to data)

For claim

18, Helms teaches, a method according to claim 1 wherein said step of providing an XML schema

further comprises the step of providing an XML schema for the protocol of the PLC, the schema including at least one of an Build Information element, a Device element, and an Exchange element, the Build Information element including at least one of a Name element, a Description element, a Tool element, a Validation Code element, a Last Build Date element, and a Last Build Time element, the Device element including at least one of a Build Information element, a Device Configuration element, and a Device Validation element, the Exchange element including at least one of a Build Information element, a Name element, a Description element, a Producer Identifier (ID) element, a Exchange ID element, a Signature element, a Source element, a Destination element, a Period element, and a Timeout element. (see Helms, paragraphs 18-22, all elements are obvious because they are definable by the user and are just data and are just labels given to data)

For claim 19, Helms teaches, a method for configuring a programmable logic controller (PLC) having a

protocol, said method comprising the step of utilizing the schema to validate at least one XML file parsed from a comma separated variable (CSV) file created by a configuration tool for a protocol different than the protocol of the PLC. (see Helms, (see

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Helms, paragraphs 18-22, the website is the configuration tool, it is obvious to use java language means to accomplish this see CSV to XML and XML to CSV, other cited in the 892 for an examples)

For claim 20, Helms teaches, a method for configuring a programmable logic controller (PLC) having a

protocol, said method comprising the step of utilizing the schema to validate at least one XML file parsed from a comma separated variable (CSV) file created by a configuration tool. (see Helms, paragraphs 18-22, its obvious to convert a CSV file to a XML DTD, java language means to accomplish this see CSV to XML and XML to CSV, other cited in the 892 for an examples)

### ***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. See attached UPSTO 892 (if appropriate).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ajay M Bhatia whose telephone number is (571)-272-3906. The examiner can normally be reached on M-F 8:30 am - 5:00 pm.


If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Valencia M Wallace can be reached on (571)-272-6159. The fax phone

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number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

AB

  
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